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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/713,267	11/17/2003	Sung-Jin Gu	Q77389	1478

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EXAMINER	
SHAPIRO, LEONID	
ART UNIT	**PAPER NUMBER**
2629	

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	12/20/2006	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

Office Action Summary	Application No.	Applicant(s)	
	10/713,267	GU, SUNG-JIN	
	Examiner	Art Unit	
	Leonid Shapiro	2629	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *21 September 2006*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-18* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-4,7-10,12-15 and 18* is/are rejected.

7)☒ Claim(s) *5-6,11,16-17* is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

1. Claims 1,4,7,10,13,18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Toffolo et al. (US Patent No. 6,628,247 B2) in view of Klein (US Patent No. 6,401,209 B1).

As to claim 1, Toffolo et al. teaches an image displayer having a function of automatically eliminating an afterimage (See Col. 1, Lines 5-9), the image displayer comprising:

a signal processing unit for processing signals and outputting video signals to a display (See Fig. 1, items 24-26, Col. 2, Lines 10-20);

a still picture corresponding to video signals of an identical pattern outputted from the signal processing unit is displayed on the display beyond a pre-set time (See Fig. 2, items 30, 32a,b, Col. 2, Lines 33-35); and

a control unit for controlling the signal processing unit (See Fig. 1, items 24-25) to display an afterimage-eliminating picture on the display eliminating the afterimage caused due to the still picture (See Fig. 3, items 30,32b, Col. 2, Lines 45-58).

Toffolo et al. does not disclose a detecting sensor for detecting whether there exists a user within a predetermined range from the display.

Klein teaches a detecting sensor for detecting whether there exists a user within a predetermined range from the display (See Fig. 2, item 100, Col. 3, Lines 23-35).

It would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate teaching of Klein into Toffolo et al. system in order to automatically switch computer to different mode when a computer user leaves the proximity of computer (See Col. 2, Lines 32-35).

As to claim 7 Toffolo et al. teaches an image displayer (See Col. 1, Lines 5-9) comprising:

a display (See Fig. 1, item 22, from Col. 1, Line 66 to Col. 2, Line 9);

a processor for processing signals to be displayed on a display (See Fig. 1, items 24-26, Col. 2, Lines 10-20);

a still picture is output from the processor and displayed on the display beyond a pre-set time (See Fig. 2, items 30, 32a,b, Col. 2, Lines 33-35); and

a controller unit for controlling the processor (See Fig. 1, items 24-25) to display an afterimage-eliminating picture on the display eliminating the afterimage caused due to the still picture (See Fig. 3, items 30,32b, Col. 2, Lines 45-58).

Toffolo et al. does not disclose a detecting sensor for detecting whether there exists a user within a predetermined range from the display.

Klein teaches a detecting sensor for detecting whether there exists a user within a predetermined range from the display (See Fig. 2, item 100, Col. 3, Lines 23-35).

It would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate teaching of Klein into Toffolo et al. system in order to automatically switch computer to different mode when a computer user leaves the proximity of computer (See Col. 2, Lines 32-35).

As to claim 13, Toffolo et al. teaches an afterimage-eliminating method of an image displayer having a function of automatically eliminating an afterimage (See Col. 1, Lines 5-9), the method comprising the steps of:

processing signals inputted from an external device and outputting video signals to a display (See Fig. 1, items 24-26, Col. 2, Lines 10-20);

sequentially comparing the video signals as outputted by each frame, thereby detecting a still picture in which identical video signals are inputted beyond a pre-set time (See Fig. 2, items 30, 32a,b, Col. 2, Lines 33-35); and

displaying on the display an afterimage-eliminating picture on the display eliminating the afterimage caused due to the still picture (See Fig. 3, items 30,32b, Col. 2, Lines 45-58).

Toffolo et al. does not disclose a detecting sensor for detecting whether there exists a user within a predetermined range from the display.

Klein teaches a detecting sensor for detecting whether there exists a user within a predetermined range from the display (See Fig. 2, item 100, Col. 3, Lines 23-35).

It would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate teaching of Klein into Toffolo et al. system in order to automatically switch computer to different mode when a computer user leaves the proximity of computer (See Col. 2, Lines 32-35).

As to claims 4,10 Toffolo et al. teaches a comparator for comparing the signals outputted from the processor thereby detecting the still picture (See Fig. 2, items 30, 32a,b, Col. 2, Lines 33-35);

a command generator for outputting a command to eliminate the

afterimage when the still picture is detected and the non-presence of the user is detected; an afterimage-eliminating picture generator for generating and outputting to the processor an afterimage-eliminating picture signal (See Fig. 3, items 30,32b, Col. 2, Lines 45-58).

As to claim 18, Toffolo et al. teaches an afterimage-eliminating method of an image displayer (See Col. 1, Lines 5-9) comprising:

processing input signals to be displayed on a display (See Fig. 1, items 24-26, Col. 2, Lines 10-20);

sequentially comparing the input signals, detecting a still picture when the respective,sequentially compared input signals are identical beyond a preset time period (See Fig. 2, items 30, 32a,b, Col. 2, Lines 33-35); and

displaying on the display an afterimage-eliminating picture on the display eliminating the afterimage caused due to the still picture (See Fig. 3, items 30,32b, Col. 2, Lines 45-58).

Toffolo et al. does not disclose a detecting sensor for detecting whether there exists a user within a predetermined range from the display.

Klein teaches a detecting sensor for detecting whether there exists a user within a predetermined range from the display (See Fig. 2, item 100, Col. 3, Lines 23-35).

It would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate teaching of Klein into Toffolo et al. system in order to automatically switch computer to different mode when a computer user leaves the proximity of computer (See Col. 2, Lines 32-35).

2. Claims 2-3,8-9,11-12,14-15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Toffolo et al. and Klein as applied to claims 1,7,13 above, and further in view of Matsuda (JP 07-295531).

As to claims 2,8,11,14 Toffolo et al. and Klein do not disclose an On-Screen Display (OSD) processing unit outputting to the signal processing unit a pre-set OSD signal indicating that the afterimage-eliminating picture is being displayed on the display, corresponding to a signal outputted from the control unit when the afterimage-eliminating picture is displayed on the display.

Matsuda teaches a message window (pre-set OSD signal in the Application) (See paragraphs 0046-0047).

It would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate teaching of Matsuda into Klein and Toffolo et al. system in order to prevent sticking (See Purpose in the Matsuda reference).

As to claims 3,9,12,15 Toffolo et al. and Klein do not disclose the steps of outputting a pre-set audio signal to output a voice message from an audio emitter indicating that the afterimage-eliminating picture is being displayed when the afterimage-eliminating picture is displayed on the display.

Matsuda teaches the steps of outputting a pre-set audio signal to output a voice message from an audio emitter indicating that the afterimage-eliminating picture is being displayed when the afterimage-eliminating picture is displayed on the display (See Constitution).

It would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate teaching of Matsuda into Klein and Toffolo et al. system in order to prevent sticking (See Purpose in the Matsuda reference).

Allowable Subject Matter

3. Claims 5-6, 11,16-17 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

4. Relative to claims 5,11,16 the major difference between the teaching of the prior art of record (Toffolo et al., Klein and Matsuda) and the instant invention is that on receipt of a signal indicating that there exists a user within the predetermined range from the detecting sensor, the controller controls the OSD processing unit to output a pre-set OSD signal to the signal processing unit, thereby allowing the user to select whether to perform an afterimage-eliminating function.

Claims 6 and 17 depend on claims 5 and 16.

Telephone Inquire

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Leonid Shapiro whose telephone number is 571-272-7683. The examiner can normally be reached on 8 a.m. to 5 p.m..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richard Hjerpe can be reached on 571-272-7691. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

LS
12.10.06

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